

ABSTRACT OF THE DISCLOSURE

By starting injection, resin pressure in front of the check valve is raised, and the check ring moves backward. Pressure of resin accumulated between flights of the screw prevents the check ring from moving backward, and the screw is kept freely rotatable to thereby make the backward speed of the check ring faster. Therefore, the check ring is brought into tight contact with the check seat quickly to close the resin path. Thereafter, the rotation of the screw is fixed, reduced pressure in the injection/dwell causes the screw to rotate in a normal direction, and prevents the resin from being pressed toward the front of the check valve.